

THAT WHICH IS CLAIMED IS:

1. A method of operating a solid state image sensor of the type comprising an array of photosensitive pixels arranged in rows and columns and in which pixel data signals are read out from the
5 pixels via column circuits which introduce column fixed pattern noise to said signals, comprising the steps of selectively inverting said signals input to said column circuits and reversing said inversion following output from said column circuits.
2. A method as claimed in Claim 1, wherein each column circuit includes an analog to digital converter and a digital inverter for selectively
5 inverting digital output from said analog to digital converter.
3. A method as claimed in Claim 1 or claim 2, wherein said selective inversion is applied to alternate rows of said pixel data.
4. A method as claimed in Claim 1 or claim 2, wherein said selective inversion is applied to alternate groups of rows of said pixel data.
5. A method as claimed in Claim 4, wherein said selective inversion is applied to alternate pairs of rows of said pixel data.
6. A method as claimed in any preceding Claim, wherein said selective inversion is applied differently to different frames of said pixel data.

7. A method as claimed in Claim 6, wherein
a first selective inversion scheme is applied to
alternate frames and a second selective inversion
scheme opposite to said first selective inversion
5 scheme is applied to intervening frames.

8. A method as claimed in any preceding
Claim, further including the step of selectively
switching outputs from adjacent columns between
adjacent column output channels prior to said selective
5 inversion of said signals input to said column
circuits.

9. A solid state image sensor of the type
comprising an array of photosensitive pixels arranged
in rows and columns and in which pixel data signals are
read out from said pixels via column circuits which
5 introduce column fixed pattern noise to said signals,
further including means for selectively inverting said
signals input to said column circuits and means for
reversing said inversion following output from said
column circuits.

10. A solid state image sensor as claimed in
Claim 9, wherein said means for selectively inverting
said signals includes a first chopping circuit included
in each column at the input to each column circuit.

11. A solid state image sensor as claimed in
Claim 9, wherein said sensor is of the active pixel
type in which pixel signal voltages and reset voltages
are input to said column circuits and wherein said
5 means for selectively inverting said signals input to

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said column circuits comprise switch means and control means associated therewith for sampling said pixel signal voltages and reset voltages.

12. A solid state image sensor as claimed in any one of Claims 9 to 11, wherein said means for reversing said inversion comprises at least one output chopper circuit.

13. A solid state image sensor as claimed in Claim 12, wherein each column of said array includes an output chopper circuit.

14. A solid state image sensor as claimed in Claim 13, wherein each column circuit includes analog-to-digital conversion means and wherein said output chopper circuit comprises digital inversion means.

15. A solid state image sensor as claimed in any one of Claims 9 to 14, wherein said selective inversion and re-inversion is controlled by a common chopping signal.

16. A solid state image sensor as claimed in any one of Claims 9 to 14, further including means for selectively switching outputs from adjacent columns between adjacent column output channels prior to said
5 means for selectively inverting said signals input to said column circuits.

17. An imaging system incorporating a solid state image sensor as claimed in any one of Claims 9 to 16.

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18. A camera incorporating a solid state image sensor as claimed in any one of Claims 9 to 16.

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